



ABSTRACT

The method uses heat flux sensors to determine the exchange area A between a reagent and housing containing the reagent, with the aim of determining the characteristics of the housing and the thermal reaction studied. The flux sensors are arranged at the housing in contact and non-contact zones of the housing with the reagent, such as to continuously determine in real time the precise surface of exchange between the housing and the reagent as a proportion of the measurements taken by each flux sensor and in such a manner as to determine the heat exchange coefficient U between the housing and the reagent from the exchange area A and a measurement of the temperature T_r of the reagent and the wall of the housing respectively, particularly when thermostatted, as in the case of the application to a calorimeter.